

THE CLAIMS DEFINING THE INVENTION ARE AS FOLLOWS:

1. A method of moulding a plastic component comprising:
locating a first pre-formed component into a first part of a mould having at least two components that, when closed, form a mould cavity,
partly closing said mould,
injecting molten plastic into said mould cavity on one side of said pre-formed component, and
closing said mould to force said molten plastic to fill said mould cavity and to bond to said one side of said pre-formed component, one part of said mould having a cutting edge that engages against and trims said pre-formed component around said cutting edge upon closure of said mould components.
2. A method of moulding according to claim 1 wherein said pre-formed component is a generally concave thin walled component with a peripheral edge curved inwardly toward the centre of said component, said cutting edge trimming said peripheral edge flush with the plastic moulded on the internal surface of said pre-formed component.
3. A method of moulding according to claim 2 wherein said mould comprises a first female part, a second male part and an intermediate part that has a surface defining: (i) an aperture through which said male part locates and (ii) an undercut recess that abuts against said inwardly curved peripheral edge of said pre-formed component.
4. A method of moulding according to claim 3 wherein said cutting edge abuts against said surface defining said aperture adjacent said undercut recess.
5. A mould for moulding a plastic component comprising:
a first part of a mould having a cavity into which a pre-formed component is located,

WO 00/67983

11

PCT/AU00/00413

a second part of said mould that locates into the cavity of said first part and forms a mould cavity between said second part and said pre-formed component, and

a cutting edge on at least one of said parts of said mould that engages against and trims said pre-formed component around said cutting edge upon closure of said mould components wherein said mould parts are partly closed prior to molten plastic being injected into said mould cavity on one side of said pre-formed component and then fully closed to force said molten plastic to fill said mould cavity and to trim said pre-formed component.

6. A mould according to claim 5 further comprising a third intermediate mould part that locates between said first and second mould parts having a surface that defines: (i) an aperture through which said male part locates and (ii) an undercut recess that locates adjacent the opening of said first mould part when said intermediate mould part is closed against said first mould part.

7. A mould according to claim 6 wherein said pre-formed component is a generally concave thin walled component with a peripheral edge curved inwardly toward the centre of said component, said peripheral edge locating within said undercut when said intermediate mould part closes against said first mould part and said cutting edge trimming said peripheral edge flush with the plastic moulded on the internal surface of said pre-formed component.

8. A mould according to claim 6 wherein said cutting edge abuts against said surface defining said aperture adjacent said undercut recess.

9. A method of moulding a plastic component in a mould having at least a male and female mould parts that form a mould cavity when said mould is closed, comprising:

locating a softened film of plastic over the recess of the female part of said mould,

WO 00/67983

drawing a vacuum within the recess of said female part of said mould that causes said film of plastic to be vacuum formed onto the surface of said female part of said mould,

partly closing said mould,

injecting molten plastic into said mould cavity on one side of said plastic film, and closing said mould to force said molten plastic to fill said mould cavity and to bond to said one side of said plastic film, one of said mould parts having a cutting edge against which another part of said mould locates so that the cutting edge trims said plastic film around said cutting edge upon closure of said mould parts.

10. A method of moulding according to claim 9 further comprising an intermediate mould part that has a surface defining: (i) an aperture through which said male mould part locates and (ii) an undercut recess that locates adjacent the opening of said female mould part when said intermediate mould part is closed against said female mould part.

11. A method of moulding according to claim 10 wherein said cutting edge abuts against said surface defining said aperture adjacent said undercut recess.

12. A method of moulding a plastic component comprising:
placing a first pre-formed component into a first half of a two part mould,
partly closing said two halves of said mould,
injecting molten plastic into said mould cavity on one side of said pre-formed component, and

closing said two halves of said mould to force said molten plastic to fill resulting mould cavity and to bond to said pre-formed component, said two halves of said mould each having cutting edges that engage upon closing of said halves to trim said pre-formed component to a required size.

13. A method according to claim 1 wherein said cutting edges act to cut said pre-formed component by said cutting edges moving past one another.

14. A mould for moulding a plastic component comprising:
a first part of a mould having a cavity into which a pre-formed component is located,
a second part of said mould that locates into the cavity of said first part and forms a mould cavity between said second part and said pre-formed component, and
a cutting edge on said first and second mould parts that trim said pre-formed components around said cutting edges when said cutting edges engage upon closing of said first and second mould parts, wherein said mould parts are partly closed prior to molten plastic being injected into said mould cavity on one side of said pre-formed component and then fully closed to force said molten plastic to fill said mould cavity and to trim said pre-formed component.
15. A mould according to claim 14 wherein said cutting edges act to cut said pre-formed component by said cutting edges moving past one another.
16. A method of moulding a plastic component comprising:
locating a first pre-formed component into a first part of a mould having at least two components that, when closed, form a mould cavity, and
closing said mould and injecting molten plastic to fill said mould cavity and to bond to said one side of said pre-formed component, one part of said mould having a cutting edge that engages against and trims said pre-formed component around said cutting edge upon closure of said mould components.
17. A mould for moulding a plastic component comprising:
a first part of a mould having a cavity into which a pre-formed component is located,
a second part of said mould that locates into the cavity of said first part and forms a mould cavity between said second part and said pre-formed component, and
a cutting edge on at least one of said parts of said mould that engages against and trims said pre-formed component around said cutting edge upon closure of said mould components wherein said mould parts are partly closed prior to molten

plastic being injected into said mould cavity on one side of said pre-formed component.

18. A method of moulding a plastic component in a mould having at least a male and female mould parts that form a mould cavity when said mould is closed, comprising:

locating a softened film of plastic over the recess of the female part of said mould,

drawing a vacuum within the recess of said female part of said mould that causes said film of plastic to be vacuum formed onto the surface of said female part of said mould, and

closing said mould and injecting molten plastic to fill said mould cavity and to bond to said one side of said plastic film, one of said mould parts having a cutting edge against which another part of said mould locates so that the cutting edge trims said plastic film around said cutting edge upon closure of said mould parts.